

## IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Mihara et al.

Serial No.:

10/680,077

Filed:

October 7, 2003

For:

DISK ROTATING APPARATUS AND INFORMATION

RECORDING/PRODUCING APPARATUS

Art Unit:

Not yet assigned

Examiner:

Not yet assigned

Customer No.:

27623

Attorney Docket No.:

40020837-02

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

## **INFORMATION DISCLOSURE STATEMENT**

Dear Sir:

In accordance with applicant's duty of disclosure under 37 C.F.R. §1.56, please find attached hereto form PTO-1449 listing information which may be material to the patentability of this application, filed on October 7, 2003. This Information Disclosure Statement is being filed:

_	Within three (3) months of the filing date of the national application;
	Within three (3) months of the date of entry of the national stage as set forth in 37 C.F.R. §1.491 in an international application;
<u> </u>	Before the mailing date of a first Office Action on the merits;
•	After the filing date or date of first Office Action, but before the mailing date of a final action under 37 C.F.R. §1.113, provided that this occurs prior to the issuance of a Notice of Allowance and provided that this I.D.S. is accompanied by either a certification as specified in 37 C.F.R. §1.97(e) or the fee set forth in 37 C.F.R. §1.17(p);

 After the filing date or date of first Office Action, but before the mailing date of a Notice of Allowance under 37 C.F.R. §1.311, provided that this occurs prior to the final action and provided that this I.D.S. is accompanied by either a certification as specified in 37 C.F.R. §1.97(e) or the fee set forth in 37 C.F.R. §1.17(p);
 After the mailing date of a final action under 37 C.F.R. §1.113, provided that this occurs prior to the issuance of a Notice of Allowance and provided that this I.D.S. is accompanied by a certification as specified in 37 C.F.R. §1.97(e) and the fee set forth in 37 C.F.R. §1.17(p); and
After the mailing date of a Notice of Allowance under 37 C.F.R. §1.311, provided that this occurs prior to or subsequent to the payment of the Issue Fee and provided that this I.D.S. is accompanied by a certification as specified in 37 C.F.R. §1.97(e) and the fee set forth in 37 C.F.R. §1.17(p).
Filing with RCF Under 37 CFR 1.114

Also enclosed are copies of US Patent No. 5,254,946; Japanese Publication Nos. 2000-331460, 2002-157858 and 2000-0187821; Articles entitled, "Study on Reduction of Disk Flutter...," Study of Aerodynamic Characteristics...," "Taming Disk/Spindle Vibrations...," Study of Aerodynamic Characteristics in Hard Disk Drives...," "An Analysis of Disk Flutter...," "Reducing Disk Flutter..." and "Suppression of Disk Flutter."

It should be understood that attention has been called to the references that have been deemed to be pertinent to the claimed present invention. In concluding what was pertinent, the criteria employed was considered most appropriate in light of the invention shown in the present application. However, the Examiner or others may deem some other criteria to be just as appropriate or more appropriate. Therefore, the Examiner is respectfully urged to review the listed references and to make the usual careful independent search for other prior art that may be pertinent.

Respectfully submitted,

January 20, 2004

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FORM PTO-14	449		Docket Number (Optional)	Application Number	lication Number					
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TRADEMA		U	S. PATEN	T DOCUMENTS				<u>.</u>		
EXAMINER INITIAL	DOCUMENT NUMBER	DATE		NAME	CLAS	S SUBCLASS	FILING DATE IF APPROPRIATE			
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			Japan			S SUBCLASS				
	NUMBER	DATE				S SUBCLASS	YES			
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FORM PTO-1449 Docket Number (Optional) Application Number 40020837-02 10/680,077 ORMATION DISCLOSURE CITATION JAN 22 200 AN APPLICATION Mihara et al. Filing Date Group Art Unit (Use several sheets if necessary) October 7, 2003 3681 TRADES! **U. S. PATENT DOCUMENTS EXAMINER** FILING DATE IF DATE INITIAL **DOCUMENT** NAME **CLASS SUBCLASS APPROPRIATE** NUMBER FOREIGN PATENT DOCUMENTS Translation DATE DOCUMENT COUNTRY **CLASS SUBCLASS** YES NO NUMBER OTHER DOCUMENTS (including Author, Title, Date, Pertinent Pages, Etc.) Tatewaki et al. "An Analysis of Disk Flutter in Hard Disk Drives in Aerodynamic Simulations," 20001, IEEE. Heo et al. "Redusing Disk Flutter by Improving Aerodynamic Design of Base Castings," 2000, IEEE. Ono et al. "Suppression of Disk Flutter by A Squeeze Air-Bearing Plate," 2000, Birkhauser Boston. **EXAMINER** DATE CONSIDERED EXAMINER: Initial if citation considered, whether or not citation is in conformance with MPEP §609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to the applicant.

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